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THE DIMENSIONALITY OF NATIONS PROJECT
QUARTERLY TECHNICAL REPORT NUMBER 5,
JULY 1, 1974 - SEPTEMBER 30, 1974

R. J. Rummel

Hawaii University

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RESEARCH REPORT

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DEPARTMENT OF POLITICAL SCIENCE
UNIVERSITY OF HAWAII

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<p>During this quarter, a set of indicators of national societies and their dyadic behavior was screened from previous results and data on them prepared for a variety of analytical studies. The linkages between these two sets of indicators was then determined using canonical analysis.</p> <p>Considerable effort also went into preparing a set of theoretical chapters on conflict theory for the principal investigator's <u>The Sociological Field and Conflict</u> manuscript.</p>			
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20. ABSTRACT--contd.

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THE DIMENSIONALITY OF NATIONS PROJECT
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THE DIMENSIONALITY OF NATIONS PROJECT

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THE DIMENSIONALITY OF NATIONS PROJECT
Department of Political Science
University of Hawaii

ABSTRACT

During this quarter, a set of indicators of national societies and their dyadic behavior was screened from previous results and data or them prepared for a variety of analytical studies. The linkages between these two sets of indicators was then determined using canonical analysis.

Considerable effort also went into preparing a set of theoretical chapters on conflict theory for the principal investigator's The Sociological and Conflict manuscript.

Asian data for fifty variables has been screened by our Asian consultant and now is in the process of final project screening.

THE DIMENSIONALITY OF NATIONS PROJECT
QUARTERLY TECHNICAL REPORT NO. 5
JULY 1, 1974 - SEPTEMBER 30, 1974

INTRODUCTION

This fifth quarterly report is divided into seven sections. The first describes the analyses initiated and completed during the quarter; the results of special significance are highlighted. Methodological problems faced during the analyses along with any computer programs that have been written or revised during the quarter are discussed in the second section. In this and the previous section, technical terms and discussions are avoided where possible. The third section describes the data collections begun and completed during the quarter. Current personnel and personnel commitments made are discussed in the fifth section and the sixth section covers project publications, research reports and monographs in preparation and completed. The final section delineates changes in the DON budget, status of subcontracts, and expenditures to date.

I. ANALYSES

1.1 Indicators. During the quarter project staff screened through and compared the various analyses done on nation attribute and behavioral data for 1950-1965. After considering a number of criteria, the following indicators were selected:

Indicators of National Societies

energy consumption per capita
totalitarianism scale
authoritarianism scale
energy production x population
population
Roman Catholics/population
number of riots
population/area
number of language plus ethnic groups
imports/trade

Indicators of Dyadic International Behavior

exports

UN voting distance

IGO comemberships/actor's common memberships

exports/actor's GNP

military acts

unofficial conflict acts

negative communication

aid

1.2 Indicator Linkages. The above indicators were selected to reflect the major dimensions of nations, such that indicators of national societies would be able to forecast their mutual behavior. To establish these linkages, canonical analyses were run on the dyadic behavior of Brazil, Burma, Indonesia, Israel, Jordan, Egypt, China, Cuba, Poland, the Netherlands, U.K., U.S.S.R. and U.S. As reported in previous Quarterly Reports, such linkages had already been established using factor scores for the dimensions.

The indicator linkages show some shifts over factor scores and the overall amount of variance in dyadic behavior accounted for by indicators is about forty percent, a decrease from forty-eight percent for factor scores.

1.3 Conflict Theory. Considerable work was done during the quarter to develop a general theory for understanding the process of conflict in society and among nations. The purpose of this effort is to better understand the relationship between DON's various time series conflict results and the power, economic, political and cultural distances between nations. Project meetings have been held and considerable historical and sociological research undertaken. A preliminary sketch of the theory, called "the conflict helix" has been incorporated with the first draft of the principal investigator's The Sociological Field and Conflict.

II. METHODOLOGY AND COMPUTER PROGRAMS

There were no new developments during the quarter.

III. DATA

Our Asian consultant has virtually completed screening for error our data on fifty variables for about four hundred Asian nation-dyads.

IV. PERSONNEL

4.1 Project Director. During the quarter the project director continued writing on The Sociological Field and Conflict. The major substantive work is completed (twenty chapters) and much integration with current sociological theories and hypotheses remain. The purpose of this volume (and the completed The Dynamic Psychological Field) is to provide a social-psychological foundation for quantitatively understanding the interests-credibility-power nexus including the contemporary nuclear balance.

4.2 Research Assistants. Dr. John J. McIlroy who has worked with the DON Project as a research assistant for three years received his Ph.D. this quarter. His dissertation concerned international trade, regional integration and conflict.

Mr. Peter Sybinsky of DON successfully passed his Ph.D. examinations and is now at work on his dissertation on the relationship between social complexity and domestic conflict.

4.3 Research Associates. Professor Chang-Yoon Choi from South Korea worked with DON during the summer. His research involved a time series analysis of the politico-military relationships between North and South Korea and the effect on these relationships of China, the U.S.S.R. and the U.S.

V. DON ACTIVITIES

5.1 Staff Meetings. Two-hour weekly meetings were continued throughout the quarter as a way of acquainting Project staff with the fundamental research and scholarly literature related to our efforts.

VI. PUBLICATIONS AND REPORTS

6.1 Manuscripts. Work on The Sociological Field has continued during the quarter. This manuscript will analyze the field of power and conflict comprising social systems and in particular reference to the international social system.

VII. BUDGET

7.1 At the conclusion of this quarter, the expenditures of DON were in line with those budgeted.

7.2 Amount Funded. The maximum amount available for reimbursement is \$104,721.00.

7.3 Estimated Expenditures and Commitments. Total expenditures to date (07-01-73 to 09-30-74): \$65,415.71 Total estimated expenditures (07-01-73 through 06-30-75): \$104,721.00.

7.4 Estimated Additional Funds Required. None. All funds have been or will be expended under the contract.